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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
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| 09/647,130 | 03/05/2001 | Dieter Dohring | TURKP0113US | 4010 |

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[REDACTED] EXAMINER

FISCHER, JUSTIN R

| ART UNIT | PAPER NUMBER |
|----------|--------------|
| | 1733 |

DATE MAILED: 08/13/2003

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Please find below and/or attached an Office communication concerning this application or proceeding.

| | | |
|------------------------------|------------------|----------------|
| Office Action Summary | Application No. | Applicant(s) |
| | 09/647,130 | DOHRING ET AL. |
| | Examiner | Art Unit |
| | Justin R Fischer | 1733 |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 28 July 2003.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-8 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-8 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) The proposed drawing correction filed on _____ is: a) approved b) disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) The translation of the foreign language provisional application has been received.
- 15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- | | |
|--|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ . |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____. . | 6) <input type="checkbox"/> Other: _____ . |

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

2. Claims 1-8 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. As amended, independent claim 1 requires that the covering layer be applied "in a wet state" (step (d)). The original disclosure fails to describe the application of the covering layer in this manner, only stating that the covering layer is applied (to the treated decorative layer) and a final drying is performed. The fact that a final drying is described does not positively suggest that the covering layer is "in a wet state" since the final drying can be required to completely cure the resin that is present in the decorative paper (unclear if "fully dried" from pre-drying step). In particular, Example 1 of the claimed invention (Page 4) describes the following sequence of events: pre-drying the treated (aluminum oxide particles) decorative paper to a moisture content of 15%, applying a covering layer comprising melamine resin and cellulose fibers, and finally drying to a moisture content of 6.0 to 6.5%. Thus, the final drying expressly reduces the moisture content of the decorative paper (from 15% to 6.0 to 6.5 %). In this same regard, the original disclosure fails to identify the moisture

content of the covering layer prior to or after the "final drying" and thus it is unclear if the covering layer was applied in a "wet state". As such, the description of the covering layer as being applied in a wet state constitutes new matter. It is further noted that the mere silence of the original disclosure as to any treatment of the covering layer prior to being applied to the pre-dried decorative layer does not provide support for the language "in a wet state". Lastly, applicant is asked to point to the original disclosure to provide support for the application of the covering layer in a "wet state".

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lindgren (US 4,940,503) and further in view of Kimura (EP 0561086), Gibbons (US 3,928,706), and Nelson (WO 98/00289). Lindgren teaches a method of forming a decorative laminate comprising the steps of spreading particulate matter, such as aluminum oxide, on a wet decorative paper impregnated with a melamine resin, pre-drying the treated decorative paper, applying a conventional overlay or covering layer to said treated decorative paper, and laminating or heat-pressing (drying) the assembly (Column 1, Line 58 – Column 2, Line 58). It is particularly noted that Lindgren suggests that a conventional overlay, which is not coated with particles, can be placed over a particle-coated sheet (decorative layer) (Column 2, Lines 33-35). While Lundgren only

describes the overlay as “conventional”, one of ordinary skill in the art at the time of the invention would have found it obvious to apply said overlay in a “wet” state since such a technique represents the well known method of applying overlays in the formation of decorative laminates. For example, Kimura (Column 3, Lines 15-23) describes a similar decorative laminate in which an overlay of melamine resin is partially dried and formed into a “semi-dried” or wet state before being applied to the decorative layers. Gibbons (Column 5, Lines 1-11) also recognizes that melamine-impregnated overlays are commonly partially dried prior to being applied to decorative layers, wherein the resin becomes fully cured during a final drying or heat-pressing step (suggests that resin remains in overlay, thus forming a “wet” layer). Nelson (Page 8, Line 17 – Page 9, Line 5) is further applied to evidence that it is also known to apply overlays to decorative papers in a fully wet state (absent any drying), if such a limitation is intended by the language “wet” in the claimed invention. Thus, Kimura, Gibbons, and Nelson recognize the common application of “wet” overlays to decorative layers in the formation of decorative laminates and as such, one of ordinary skill in the art at the time of the invention would have readily appreciated the “conventional” overlay of Lindgren as being applied in a “wet” state.

Regarding claims 2 and 7, Lindgren describes the overlay paper as alpha cellulose paper and suggests the use of melamine resin, which represents a common and extensively used resin in the formation of overlays (Column 2, Lines 26-30).

With respect to claim 3, Lindgren suggests a suitable average particle size of as high as 80 μm (Column 2, Lines 60-65). One of ordinary skill in the art at the time of the

invention would have readily appreciated the inclusion of particles having a particle size of "about 125 μm " since the range of Lindgren suggests particles sizes greater than and below 80 μm , it being further noted that the original disclosure fails to expressly define the range suggested by "about 125 μm ".

Regarding claim 4, as previously stated, Lindgren suggests an embodiment in which the aluminum oxide particles are applied to a decorative paper (decor paper) and a conventional overlay is subsequently disposed over the treated decor paper. In describing the decor paper, Lindgren teaches an exemplary embodiment in which said decor paper has an area density or surface weight of 80 grams per square meter (Column 7, Lines 20-25 and Lines 55-60). While Lindgren fails to define the surface weight after impregnation and coating of the decor paper with the aluminum oxide particles, it is clearly evident that the surface weight would increase due to the impregnating resin and the aluminum oxide particles. As such, one of ordinary skill in the art at the time of the invention would have readily appreciated a surface weight for the decor paper of between 140 and 150 grams per square meter, there being no conclusive evidence of unexpected results to establish a criticality for such a surface weight. It is further noted that the surface weight of the decor paper (after impregnation, coating of particles, and drying) is dependent on, among other things, the initial surface weight of the decor paper and the quantity of particles, such that it would have been within the purview of one of ordinary skill in the art at the time of the invention to form a decor paper having a surface weight of between 140 and 150 grams per square meter depending on the specific product being manufactured. Lastly, it is noted that the pre-

impregnated surface weight of the decor paper of the claimed invention (Examples 1 and 2) is extremely similar to that detailed by Lindgren and further, the quantity of aluminum oxide particles applied in the claimed invention is extremely similar to that detailed by Lindgren.

With respect to claims 5 and 6, Lindgren suggests the application of between 2 and 20 grams per square meter (Column 1, Lines 65-68).

5. Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over Lindgren, Kimura, Gibbons, and Nelson as applied to claim 1 above and further in view of Veneziale, Jr. (US 3,663,341). As previously stated, Lindgren describes the use of a "conventional" overlay in combination with a particle treated decorative sheet in the manufacture of a decorative laminate. Lindgren further states that overlay paper is commonly alpha cellulosic paper (Column 2, Lines 25-30). However, it is well known in the decorative laminate industry that alternative materials can be used as the overlay material. Veneziale, Jr. provides one example of forming a decorative laminate in which the outermost overlay sheet or protective sheet is formed of glass fibers. Thus, it is recognized in the decorative laminate industry that glass fiber overlays provide sufficient protection to decorative laminates and are clear/transparent after heat pressing (required such that the decorative layer is visible). As such, it would have been obvious to one of ordinary skill in the art at the time of the invention to form the "conventional" overlay of Lindgren as a glass fiber overlay since such materials are commonly used to form overlays used as protecting layers in decorative laminates.

Conclusion

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6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Justin R Fischer** whose telephone number is **(703) 605-4397**. The examiner can normally be reached on M-F (7:30-4:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Ball can be reached on (703) 308-2058. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9310 for regular communications and (703) 872-9311 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.



Justin Fischer

August 7, 2003



Michael W. Ball
Supervisory Patent Examiner
Technology Center 1700